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| APPLICATION NO.  | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|--|-------------|----------------------|---------------------|------------------|
| 10/018,851   | 12/17/2001  | Shoji Oiso           | 576P043             | 8230             |
| 7590   | 12/03/2003  |                      | EXAMINER            |                  |
| Kevin S Lemack<br>Nields & Lemack<br>176 E Main Street Suite 8<br>Westboro, MA 01581 |             |                      | HON, SOW FUN        |                  |
|  |             |                      | ART UNIT            | PAPER NUMBER     |
|  |             |                      | 1772                |                  |

DATE MAILED: 12/03/2003

11

Please find below and/or attached an Office communication concerning this application or proceeding.

clo 11

|                              |                        |                     |  |
|------------------------------|------------------------|---------------------|--|
| <b>Office Action Summary</b> | <b>Application No.</b> | <b>Applicant(s)</b> |  |
|                              | 10/018,851             | OISO ET AL.         |  |
|                              | <b>Examiner</b>        | <b>Art Unit</b>     |  |
|                              | Sow-Fun Hon            | 1772                |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

1) Responsive to communication(s) filed on 22 September 2003.

2a) This action is **FINAL**.                    2b) This action is non-final.

3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

4) Claim(s) 1-3 is/are pending in the application.

4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.

5) Claim(s) \_\_\_\_\_ is/are allowed.

6) Claim(s) 1-3 is/are rejected.

7) Claim(s) \_\_\_\_\_ is/are objected to.

8) Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

9) The specification is objected to by the Examiner.

10) The drawing(s) filed on \_\_\_\_\_ is/are: a) accepted or b) objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. §§ 119 and 120**

12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) All    b) Some \* c) None of:  
1. Certified copies of the priority documents have been received.  
2. Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

13) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.  
a) The translation of the foreign language provisional application has been received.

14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

**Attachment(s)**

1) Notice of References Cited (PTO-892)                    4) Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.  
2) Notice of Draftsperson's Patent Drawing Review (PTO-948)                    5) Notice of Informal Patent Application (PTO-152)  
3) Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.                    6) Other: \_\_\_\_\_

**DETAILED ACTION**

***Response to Amendment***

***Withdrawn Rejections***

1. The 37 CFR 1.75(c) objection to claim 3 and the 35 U.S.C. 112, 2<sup>nd</sup> paragraph rejections of claims 1-8 in Paper # 8 (mailed 06/04/03) have been withdrawn due to Applicant's amendment of claims 1-3 and cancellation of claims 4-8 in Paper # 10 (filed 09/22/03).

***New Rejections***

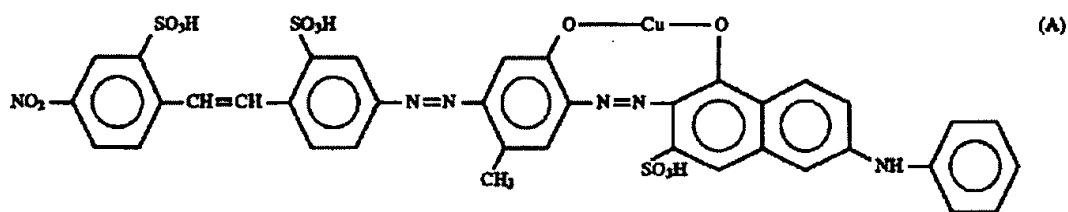
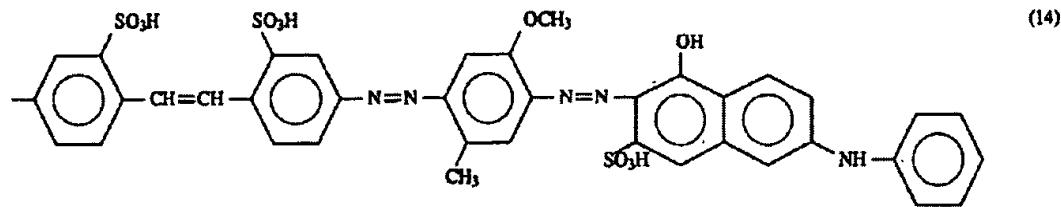
***Claim Rejections - 35 USC § 103***

2. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
3. Claims 1-3 are rejected under 35 U.S.C. 103(a) as being unpatentable over Misawa et al. (US 5,548,073) in view of Claussen et al. (US 5,272,259).

Misawa et al. teaches that it is common to have a polyvinyl alcohol type (or a derivative thereof) polarizing film containing, in a substrate for the polarizing film, a water soluble dye represented by the following formula (A) in the form of a free acid (column 1, lines 15-70) shown on the next page, wherein X of Applicant is the NO<sub>2</sub> (nitro group) on the left end of molecule (A) which is the copper complex salt. An analogous uncomplexed formula (14) is shown above formula (A) on the next page. Since the sulfonate (SO<sub>3</sub>H) groups on opposite sides of the stilbene moiety, which forms the leftmost portion of the dye molecule, have greater steric stability trans to each other instead of cis as represented on the next page, it is the examiner's

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position that the more stable trans isomer as claimed by Applicant is present in the greater amount in the azo dye.

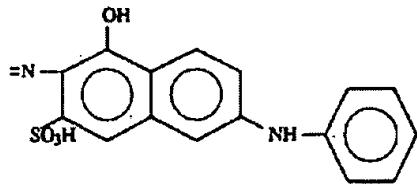


Although Misawa et al. demonstrates that the common dye of formula (A) has inferior polarity (column 27, lines 45-70 and column 28, lines 1-5) compared with the azo dyes of Misawa et al., Misawa et al. does not teach that it cannot be used.

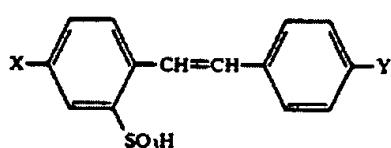
Misawa et al. is directed to a polarizing film with two or more dyes used in combination to provide a neutral color (column 2, lines 5-20). The polarizing film can be laminated with a protective film (column 9, lines 5-15).

Misawa et al. fails to teach that the phenylamino substituent on the sulfonic acid-substituted naphthalene moiety, which is the far right portion of the dye molecule shown on the next page, is replaced by a phenylazo substituent:

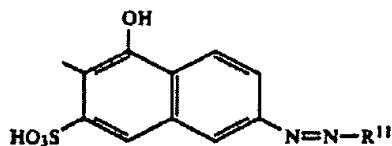
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Claussen et al. teaches a polyvinyl alcohol type (or a copolymer) polarizing film containing, in a substrate for the polarizing film, a water soluble dye in the form of a free acid (abstract) directed to produce a neutral color with uniform dichroism (column 1, lines 50-55) with the following formula I (column 2, lines 1-30) below:



wherein X, Y signify  $-\text{N}=\text{N}-\text{R}$  and R can be the moiety below:



and wherein  $\text{R}^{11}$  is a substituted or unsubstituted phenyl radical (column 3, lines 10-15).

Since both Claussen et al. and Misawa et al. are directed to polyvinyl alcohol type films comprising an azo dye to form a polarizing film with neutral color, they are analogous art.

Therefore it would have been obvious to one of ordinary skill in the art to have used a phenylazo group as taught by Claussen et al. in place of the phenylamino substituent on the naphthalene moiety of the common azo dye molecule in the prior art disclosed by Misawa et al. in order to obtain a polarizing film containing a dichroic azo dye molecule with uniform dichroism.

***Response to Arguments***

4. Applicant's arguments with respect to claims 1-3 have been considered but are moot in view of the new ground(s) of rejection.

***Conclusion***

5. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication should be directed to Sow-Fun Hon whose telephone number is (703)308-3265. The examiner can normally be reached Monday to Friday from 9:00 AM to 6:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Harold Pyon, can be reached on (703)308-4251. The fax phone number for the organization where this application or proceeding is assigned is (703)872-9311.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)308-0661.

SH  
Sow-Fun Hon  
11/24/03

  
HAROLD PYON  
SUPERVISORY PATENT EXAMINER  
1772

11/25/03